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# TWO NEW SPECIES OF CINARA FROM ALASKA (APHIDAE)

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The two new species of Cinara described herewith add to the little known Aphid fauna of Alaska.

**Cinara bonita** n. sp.
*Apterous viviparous female.*

Length from vertex to end of abdomen 5.675mm. Color and pulverulence in life not recorded. The head of the specimen from which this species is described is brown, the clypeus is also brown, but much darker than the head. The natural color has been removed from the thorax and abdomen. The coxae are a deep brown. The femora are yellowish-brown except for the extreme base which is yellowish. Tibiae brown, the brown being somewhat darker at the base and much darker towards the apex. Tarsal segments concolorous with apex of tibiae, except for a small amount of black on the first segment. First antennal segment concolorous with head, second and third antennal segments pale dusky, remaining antennal segments slightly darker. All antennal segments quite uniform in color from end to end. Cornicles cauda and anal plate slightly darker than abdomen, which is free from pigmented spots.
*Head and thorax.*—Vertex and dorsum of head with hairs moderately coarse, sharp-pointed and about .08mm, in length. Median suture of head narrow and dark brown in color. The eyes are small. Ocular tubercles present but small. Rostrum not extended. Last three segments of rostrum with the following lengths: .24, .22 and .01mm. Length of antennal segments as follows: III .54mm., IV .18mm., V .26mm., VI .18+ .03mm. Third antennal segment without sensoria, fourth antennal segment with a very small primary sensorium, fifth antennal segment with one very small secondary sensorium, and a moderately tuberculate primary sensorium. Hair on posterior margin of third antennal segment sparce, slightly finer and shorter than elsewhere. The hair on the anterior margin of the third antennal segment varies from .06-.7mm. in length, and is set at an angle of about fortyfive degrees. The fifth and sixth antennal segments are weakly imbricated. Mesosternal tubercle not apparent. All femora with numerous long fine hairs, the hairs varying in length from .07-.10 mm. Length of pro, meso and metathoracic femora 1.08, 1.05 and 1.41mm. Length of pro meso and metathoracic tibiae 1.425, 1.425 and 2.02mm. Hair on outer margin of hind tibiae about .10mm. in length, upstanding, some set at an angle of about

ninety degrees, remaining hair on tibiae less upstanding, finer and slightly shorter. Hair on inner margin of hind tibiae more numerous than hair on outer margin. Ventral surface of first metatarsal segment with about eighteen hairs, this segment is about .14mm. in length. Second metatarsal segment .50mm. in length, hairs on the ventral surface of this segment finer and shorter than those on the dorsal surface. Dorsal and ventral surfaces of abdomen with hairs of about the same length being more or less equal to the length of the hairs on the cornicles. Base of cornicles quite regular in outline, almost round measuring about .22mm. across. The cornicles have about three rows of hairs all of which point away from the rim, all hairs are of about the same length. Waxpore plates present on the dorsum of abdomen, small, arranged in about six irregular rows.

This species differs from *C. abieticola* (chol.) and *C. sonata* H. in not having pigmented spots on the dorsum of the abdomen, the unguis is not long or thin enough to be nail-like, the cornicles have only one kind of hairs. The pigmented spots anterior to the cauda are lacking. Holotype apterous viviparous female, deposited in the collection of the United States National Museum. Host not recorded, most likely *Picea* either *glauca* or *mariana*. Gulkana River, Alaska. Summer 1955. Coll. G. D. Schumann.

**Cinara bonica** n. sp.

*Apterous viviparous female.*

Length from vertex to end of abdomen varying from 3.38-3.60mm. Color in life not recorded, cleared specimens indicate the head as dusky. First two antennal segments concolorous with head, remaining antennal segments pale dusky, quite uniform in color from end to end. Femora dusky brown, much darker at apex. Tibiae dusky brown, slightly darker towards apex. Tarsal segments concolorous with apex of tibiae. Cornicles much darker than abdomen. Abdomen free from pigmented spots on the dorsum, except for waxpore plates and block shaped pigmented areas anterior to cauda.

*Head and thorax.*—Length of antennal segments as follows: III .40-.45mm., IV .18mm., V .24-.255mm., VI .18-.20+.015mm. Third and fourth antennal segments without sensoria. Fifth antennal segment without or with one secondary sensorium and primary. Primary sensorium on sixth antennal segment slightly tuberculate, marginal sensoria with wide rims. Unguis extremely short, and thick. Hair on antennae moderately abundant, rather upstanding, about .12mm. in length. All antennal segments almost smooth. Hair on head similar to hair on third antennal segment. Transverse median suture narrow and dark. Rostrum not extended, last three segments with the following lengths: .24, .21, and .12mm. Mesosternal tubercle not present. Pro, meso and metathoracic femora with the following lengths: 1.095, 1.125, 1.50mm. Length of pro, meso and metathoracic tibiae as follows: 1.35-1.50, 142-165, 198-226mm. Length of metathoracic tarsal segments .12 and .34mm. All femora with large irregular shaped sensoria. Hair on femora fine, long and numerous. Hair on metathoracic tibiae similar on both outer and inner margins fine, about .15mm. in length. Hairs on outer surface of tibiae more upstanding than those on inner margin. Ventral surface of first tarsal segment with about ten hairs. Hairs on dorsal and ventral

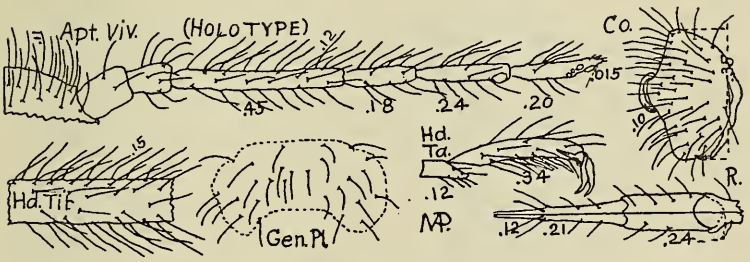
surfaces of second tarsal segment of about the same length, but more numerous on ventral surface.

*Abdomen.*—Anterior dorsum of abdomen with about two rows of very narrow waxpore plates. Cornicles with outer margin very regular in outline, and varying in width from .33-355mm. Cornicles with about six rows of hairs, all hairs similar in character but hairs on restricted area shorter. Dorsum of abdomen with setulae very fine and short, arranged in trasverse anastomosing rows which give this surface a reticulated appearance. Hair on ventral and dorsal surfaces of abdomen numerous, and similar in character and length. Pigmented areas anterior to caude with irregular outline, block shaped with hairs few and limited to posterior half.

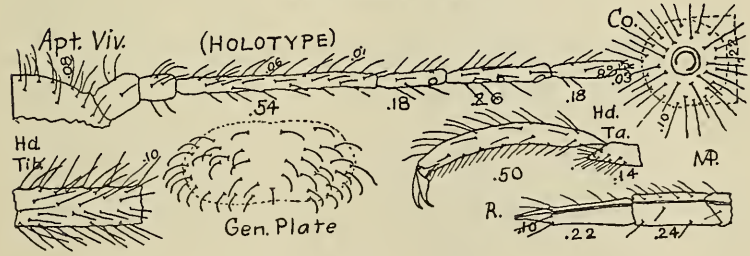
This species appears to be most closely allied to *C. bonita* differing from that species in the shorter second tarsal segments, number of rows of hairs on the cornicles, the presence of pigmented spots anterior to the cauda, longer hairs on the ventral surface of the second tarsal segment, longer tibial hairs, and the shorter unguis.

Host unknown, as it was not recorded. The most likely host is white spruce, *Picea galuca*, there is also the possibility that the host was black spruce, *Picea mariana* which grows in association with the white spruce, along the Gulkana River. Gulkana River, Alaska Summer 1955. Coll. G. O. Schumann.

Holotype deposited in the collection of the United States National Museum. The holotype an apterous viviparous female, is mounted under the same cover slip as the holotype of *Cinara bonita*, both species may have been taken on the same or different hosts.




Cinara Bonica, n. sp.




Cinara Bonita n. sp.